

Status Of Claims

Claims 1-12 are pending.

Claims 1-12 stand rejected.

Claims 1-12 have been amended, without prejudice or disclaimer.

Claim 13 has been added herein.

Remarks/Arguments

Reconsideration of this application is requested.

The specification has been amended to correct a typographical error. The Abstract has been amended to better conform to U.S. practice.

Claims 1-12 have been amended. Support for the amendments to Claim 1 may be found throughout the specification. For example, the specification explains that Fig. 1 of the subject application shows an arrangement for processing signals. *See, e.g., specification, pg. 6, l. 36 – pg. 7, l. 2.* Therein, processing block 14 processes input signals (Sin) and provides as output signal (Sout), which is a function of a control value (A) and the input signal (e.g., Sout(A, Sin)). *See, e.g., Fig. 1; see also, e.g., specification, pg. 7, ll. 13-34.*

Claim 1 as originally filed recited an operating element having an actuation element; Applicant's specification teaches that: (1) in the case of a linear conversion of the position of the actuation element, relatively small corrections of the processed audio or video signal are associated with small alterations of the position of the actuation element; and (2) relatively large corrections of the processed audio or video signal are correspondingly associated with large alterations of the position of the actuation element. The linear conversion can have the effect that the operability becomes difficult in the region of small corrections since even very small movements of the actuation element lead to corresponding changes in value. In the case of a large correction, the operator has to perform large movements in order to set the high correction value desired. Under certain circumstances, the large movement required cannot be performed rapidly enough.

Further, Claim 1 as originally filed recited that the numerical translation was in accordance with a “selectable assignment characteristic curve”, and Fig. 2 of the subject application illustrates several characteristic curves. The specification explains that a control quantity (K) is fed to a converter (13) to select the assignment characteristic curve. Accordingly, no new matter has been added by this amendment.

Claims 2-12 have been amended consistent with amended Claim 1. Claims 9, 10 and 12 have been amended to depend from Claim 8.

Claim 13 has been newly added. Support for new Claim 13 may be found throughout the specification. For example, Fig. 1 of the subject application illustrates an operating element 10 that responds to user manipulation, a first converter 12 translating position signals P into first numerical values; and a second converter 13 translating the first numerical values into second numerical values in accordance with an assignment characteristic curve (see, Figs. 2 and 3, for example), wherein, a control quantity K is applied to the second converter, which effects the selection of the assignment characteristic curve from a plurality of characteristic curves (see, Figs. 2 and 3, for example). Accordingly, no new matter has been added.

Objection to the Abstract

In response to Item 1 of the Office action, Applicant has provided a substitute abstract herein.

35 U.S.C. 112, second paragraph, Rejections

Claims 11 and 12 stand rejected under 35 U.S.C. 112, second paragraph, as allegedly being indefinite for failing to particularly point out and distinctly claim the subject matter Applicant regards as the invention. More particularly, the Office action argues what is being processed is unclear in Claims 11 and 12.

In response, Applicant has amended Claim 11 to omit the “processing” language and to recite that the “operating element selects a position in an editing control unit.”

Applicant has amended Claim 12 to depend from Claim 8 and to more clearly recite that the “processing of at least one of video and audio signals comprises setting a pitch”.

Accordingly, Applicant respectfully submits the present claims fully meet the requirements of 35 U.S.C. § 112; reconsideration and removal of this rejection is respectfully requested.

35 U.S.C. 103 Rejections

Claims 1-12 stand rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent No. 5,659,480 (Anderson) in view of U.S. Patent No. 5,999,215 (Tamura). Applicant requests reconsideration and removal of these rejections for at least the following reasons.

To establish a *prima facie* case of obviousness, all of the recited claim limitations must be taught or suggested in the prior art. *See, MPEP 2143.03; see also, In re. Royka, 490 F.2d 981, 180 USPQ 580 (CCPA 1974)*. Further, there must be some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to combine reference teachings. *See, M.P.E.P. §706.02(j); see also, In re Vaeck, 947 F.2d 488, 20 USPQ2d 1438 (Fed. Cir. 1991)*. Applicant respectfully submits Anderson and Tamura fail, in any combination, to teach or suggest each of the limitations of any of the pending claims for at least the following reasons.

Amended Claim 1 recites, *inter alia*, “a control apparatus ... wherein a control quantity is applied to the second converter, which effects the selection of a specific assignment characteristic curve from a plurality of curves.” Figs. 2 and 3 of the subject application illustrate a plurality of curves 1-5, and as is discussed in connection with Fig. 1 of the subject application, a control quantity K is fed to converter 13, and selects an assignment characteristic curve. *See, e.g., specification, pg. 7, ll. 26-28*. Anderson and Tamura fail, in any combination, to teach a converter that has a control quantity applied thereto, which effects the selection of a specific assignment characteristic curve from a plurality of curves – as is recited by Claim 1. For at least this reason, the cited art fails to teach each of the limitations of present Claim 1. Reconsideration and withdrawal of this 35 U.S.C. § 103 rejection is requested.

Notwithstanding that the foregoing deficiency of Anderson and Tamura is sufficient to require reconsideration and removal of each of the 35 U.S.C. 103(a) rejections presented in the Office action, Applicant further notes that the present invention is directed to a control element having a user manipulated operating element, via which, for example, a user can control processing parameters in a video processing apparatus. The user manipulated operating element includes an actuation element such as a rotary button or a knob. The rotary button is coupled to a linear sensor element which outputs position values P . Turning the rotary button by 1° results in a corresponding change in the output value. The translation of the rotation to output values is linear. The output values coming from the linear sensor element are fed to a converter where they are converted into numerical control values E . Up to this point the relation between turning the rotary button and the output value is still linear. The characteristics of change that are related to turning the knob for a certain angle can be changed by applying a control quantity K to a further converter. This further converter outputs a control value A which is ultimately applied to the signal-processing unit. By correspondingly modifying the control quantity K the relation between the control values E and the control values A is changed so that it is no longer linear. In this way it is possible to use an otherwise linear rotary button for providing control values following a desired non-linear characteristics curve. In other words the control quantity K is used for assigning a characteristic curve to the control element.

Consistently, Claim 1 calls for a "user manipulated operating element". In contrast, no user manipulated operating element, such as a button or knob that can be operated by a user, is used in Anderson. Rather, Anderson is related to actuators or actuation elements in the sense of servo motors, which actuate mechanical elements under control of a computer. The Tamura reference fails to apply a control quantity to a further converter for modifying a characteristic curve in a control element.

For at least the foregoing reasons, amended claim 1 is patentably distinguishable over the prior art of record. Claims 2-12 ultimately depend from Claim 1, and are allowable at least by virtue of their dependence on an allowable base claim.

Serial No.: 10/612,186
Internal Docket No. PD020064

New Claim 13 is an independent claim directed to control apparatus having limitations similar to those of Claim 1. Claim 13 is likewise allowable over the cited art of record.

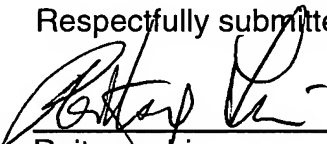
Conclusion

Having fully addressed the rejections, it is believed that, in view of the preceding amendments and remarks, this application stands in condition for allowance.

Accordingly, reconsideration and allowance are respectfully solicited. If, however, the Examiner is of the opinion that such action cannot be taken, the Examiner is invited to contact the applicant's attorney at (609) 734-6813, so that a mutually convenient date and time for a telephonic interview may be scheduled.

No fee is believed due. However, if a fee is due, please charge the fee to Deposit Account 07-0832.

Respectfully submitted,


By. Reitseng Lin
Reg. No. 42,804
Phone (609) 734-6813

Patent Operations
Thomson Licensing Inc.
P.O. Box 5312
Princeton, New Jersey 08540
November 14, 2006